

Amendments to the Specification:

Insert the paper copy of the Sequence Listing filed herewith following the Drawings.

Please replace the paragraph beginning at page 39, line 7, with the following amended paragraph:

The polypeptide can increase heterologous gene expression, e.g., a gene operable linked to a strong promoter such as a viral promoter, in a mammalian cell. For example, the isolated polypeptide can include an amino acid sequence that is identical to the zinc finger array within SEQ ID NO: ~~[[262]]~~ 64 or that differs by no more than 8, 6, 4, 3, or 2 substitutions within the zinc finger domains present in SEQ ID NO: ~~[[262]]~~ 64. The substitutions can be conservative substitutions. The isolated polypeptide can have a sequence that is at least 80, 85, 90, 95, or 97% identical to the zinc finger array within SEQ ID NO: ~~[[262]]~~ 64. In one embodiment, the polypeptide can specifically bind to a target DNA site. For example, the polypeptide can compete with the K44-16-E12 chimeric ZFP (SEQ ID NO: ~~[[262]]~~ 64) for binding to a target DNA site, e.g., a site bound with a K_d of less than 10 nM. The polypeptide can further include a transcriptional regulatory domain, e.g., an activation or repression domain. The polypeptide can include one, two, or three or more additional zinc finger domains. Since the K44-16-E12 chimeric ZFP includes a repression domain it is unlikely to increase heterologous gene expression by directly binding to the promoter of the heterologous gene.

Please replace the paragraph beginning at page 39, line 21, with the following amended paragraph:

Also featured are nucleic acids encoding the above polypeptides. For example, the isolated polypeptide that includes the amino acid of SEQ ID NO: ~~[[262]]~~ 64 can be encoded by a nucleic acid sequence that includes the sequence of SEQ ID NO:261. Featured nucleic acids can

include operably linked regulatory sequences, e.g., a promoter sequence, an enhancer sequence, an insulator sequence, untranslated regulatory regions, a polyA addition site, and so forth. In one embodiment, the coding nucleic acid is operably linked to a conditional promoter such as an inducible promoter or a cell-type specific promoter. The nucleic acid can be included in a vector or integrated into a chromosome.

Please replace the paragraph beginning at page 42, line 17, with the following amended paragraph:

In still another aspect, the invention features an artificial polypeptide that includes: the sequence:

CX₍₂₋₅₎CXXXBXQXSHJXVHX₍₃₋₅₎HX₍₁₋₆₎BXCX₍₂₋₅₎CXXXBXQXSNJXIHX₍₃₋₅₎HX₍₁₋₆₎BXCX₍₂₋₅₎CXXXBXQXTHJXRHX₍₃₋₅₎HX₍₁₋₆₎BXCX₍₂₋₅₎CXXXBXCSNJXRHX₍₃₋₅₎H (SEQ ID NO: **[265]** 62),

CX₍₂₋₅₎CXXXBXQXSHJXVHX₍₃₋₅₎HX₍₁₋₆₎BXCX₍₂₋₅₎CXXXBXVXSTJXRHX₍₃₋₅₎HX₍₁₋₆₎BXCX₍₂₋₅₎CXXXBXRNDNJXQHX₍₃₋₅₎HX₍₁₋₆₎BXCX₍₂₋₅₎CXXXBXQXTHJXRHX₍₃₋₅₎H (SEQ ID NO: **[266]** 63),

where B is any amino acid, or optionally phenylalanine or tyrosine; and J is any amino acid, or optionally, a hydrophobic amino acid. These arrays are also abbreviated as: QSHV-QSNI-QTHR-CSNR and QSHV-VSTR-RDNQ-QTHR (where each set of four amino acids corresponds to the DNA contacting residues of a zinc finger domain and non-DNA contacting residues may vary).

Please replace the paragraph beginning at page 50, line 26, with the following amended paragraph:

FIG. 25 lists the coding nucleic acid (SEQ ID NO:261) and amino acid (SEQ ID NO: **[262]** 64) sequences for K44-16-E12, which includes the zinc finger domains QSHV-QSSR1-QTHR1-kid.